

(11)Publication number:

2000-010787

(43) Date of publication of application: 14.01.2000

(51)Int.CI.

G06F 9/445 G06F 9/06

(21)Application number: 10-176900

(71)Applicant: NEC CORP

**NEC SHIZUOKA LTD** 

(22)Date of filing:

24.06.1998

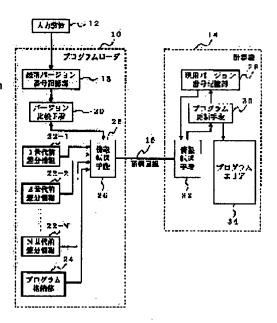
(72)Inventor : KUDO MASAMITSU

OISHI TAKAHIRO

## (54) PROGRAM DOWN-LOADING DEVICE AND ITS METHOD

#### (57)Abstract:

PROBLEM TO BE SOLVED: To provide a program down-loading device capable of speedily sending a program by down-loading only differential information to a group of terminal devices with dispersion in the versions of programs. SOLUTION: In a system connecting a computer 14 and a program loader 10 through a communication line 16, at the time of down-loading a newest version program stored in the loader 10 to the computer 14, only differential information is down-loaded by plurally having differential information of the newest version program and a program stored in the computer 14, thereby the down-loading time is shortened.



#### **LEGAL STATUS**

[Date of request for examination]

24.06.1998

[Date of sending the examiner's decision of rejection]

14.11.2000

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]

[Date of extinction of right]

Copyright (C); 1998,2003 Japan Patent Office

(11)Publication number:

11-327828

(43) Date of publication of application: 30.11.1999

(51)Int.CI.

606F 3/12 B41J 29/38 G06F 9/445

(21)Application number: 10-137843

(71)Applicant:

**CANON INC** 

(22)Date of filing:

20.05.1998

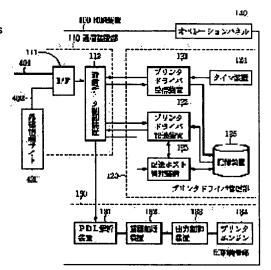
(72)Inventor:

**OMURA HIROSHI** 

# (54) PRINTING CONTROLLER, DRIVER MANAGING METHOD FOR THE SAME AND STORAGE MEDIUM STORING PROGRAM WHICH COMPUTER CAN READ

#### (57)Abstract:

PROBLEM TO BE SOLVED: To considerably reduce the update operation of a printer driver and update management burden imposed on users. SOLUTION: A printer driver which is to be installed in a host is registered in a storage device 125 and the printer driver is managed so that the printer driver is automatically updated while the update state is automatically judged by periodical communication with an outer information site by a printer driver distribution device 122 and a distribution host management device 123. Thus, trouble for managing a storage medium for transporting the printer driver to be installed for a data processor which a user intends can be saved.



# **LEGAL STATUS**

[Date of request for examination]

[Date of sending the examiner's decision of rejection]

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]

[Date of extinction of right]

(11)Publication number:

10-171634

(43) Date of publication of application: 26.06.1998

(51)Int.CI.

G06F 9/06 G06F 3/12 G06F 9/445

(21)Application number: 08-325702

(71)Applicant :

**FUJI XEROX CO LTD** 

(22) Date of filing:

05.12.1996

(72)Inventor:

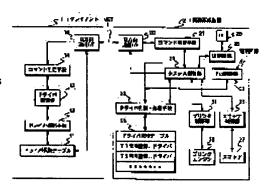
YAGI HIROSHI

#### (54) INFORMATION PROCESSING TERMINAL AND PROGRAM UPDATING SYSTEM

(57) Abstract:

PROBLEM TO BE SOLVED: To discriminate whether a program is new or old and to efficiently update the program.

SOLUTION: When communication is generated between a client 1 and an image forming device 2, management information related to a driver (control program) being used at present is transferred from the client 1 to the device 2. A driver discriminating/processing means 22 extracts a management table of which OS version coincides with an OS name included in the received management information and compares version information stored in the extracted table with the version information in the received management information, thereby discriminating the new/old state of the driver. When the driver of the device 2 is newer than that of the client 1, the device 2 transfers the new driver to the client 1 together with new management information. The transferred new driver is stored in a driver storing table 11 corresponding to the new management information.



#### **LEGAL STATUS**

[Date of request for examination]

22.07.2002

[Date of sending the examiner's decision of rejection]

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]

[Date of extinction of right]

Copyright (C); 1998,2003 Japan Patent Office

(11)Publication number:

08-161250

(43) Date of publication of application: 21.06.1996

(51)Int.CI.

GO6F 13/10 **606F** 3/12 9/06 9/445

(21)Application number: 06-301723

(71)Applicant:

**CANON INC** 

(22)Date of filing:

06.12.1994

(72)Inventor:

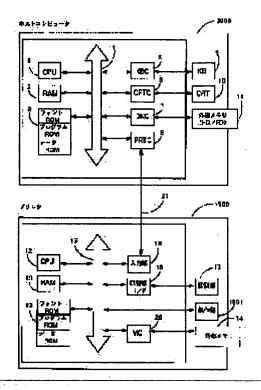
**NAKAGIRI KOJI** 

## (54) INFORMATION PROCESSOR

#### (57)Abstract:

PURPOSE: To provide an information processor capable of automatically incorporating a device driver suitable for a peripheral equipment to be used in an OS without the aid of a user.

CONSTITUTION: A printer 1500 is connected through a bidirectional interface to a host computer 3000 and plural printer drivers corresponding to the respectively different OSes of the host computer are stored in the data ROM 13 or external storage device 14 of the printer 1500. When the printer driver of the printer 1500 is not prepared on the side of the host computer 3000, the printer driver suitable of the OS of the host computer 3000 is transferred from the printer 1500 to the host computer 3000 and incorporated in the OS of the host computer 3000.



## **LEGAL STATUS**

[Date of request for examination]

11.07.2000

[Date of sending the examiner's decision of rejection]

15.06.2004

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]

[Date of extinction of right]

(11)Publication number:

09-251355

(43) Date of publication of application: 22.09.1997

(51)Int.CI.

G06F 3/12 G06F 13/00

(21)Application number: 08-087483

(71)Applicant :

RICOH CO LTD

(22)Date of filing:

15.03.1998

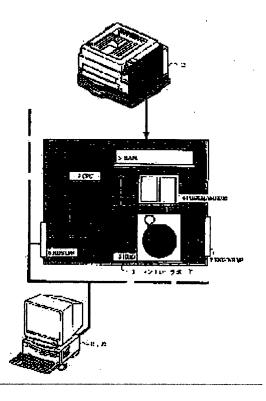
(72)Inventor:

YOSHIOKA TATSURO

## (54) PRINTER

#### (57)Abstract:

PROBLEM TO BE SOLVED: To provide a printer capable of carrying out the version—up of a printer program without any operation of a user. SOLUTION: A controller board 1 periodically accesses a network server 11 every three days for instance based on a program stored in a program ROM 4 beforehand and retrieves whether or not the printer driver program and the system program of this printer of the version newer than the version stored in an HDD(hard disk drive) 5 are up—loaded. In the case that the new version is present, it is down—loaded from the network server 11 to the HDD 5 and then, the abstract is stored in the HDD 5.



## **LEGAL STATUS**

[Date of request for examination]

[Date of sending the examiner's decision of rejection]

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]

[Date of extinction of right]

Copyright (C); 1998,2003 Japan Patent Office

(11)Publication number:

10-091500

(43) Date of publication of application: 10.04.1998

(51)Int.CI.

G06F 12/00 G06F 9/06

G06F 13/00

(21)Application number: 08-243021

(71)Applicant : NEC CORP

(22)Date of filing:

13.09.1996

(72)Inventor:

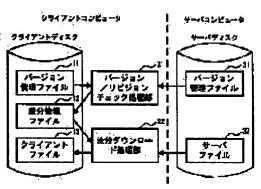
**TATSUTAKI MINORU** 

# (54) CLIENT/SERVER SYSTEM, DIFFERENTIAL FILE DOWN LOADING METHOD IN CLIENT/SERVER SYSTEM AND STORAGE MEDIUM STORING PROGRAM FOR DIFFERENTIAL FILE DOWN LOADING

#### (57) Abstract:

PROBLEM TO BE SOLVED: To permit all client computers to hold the file of the latest state similar to that of a server computer.

SOLUTION: A first version management file 3 storing the latest state of correspondence on a file name and the number of update times is provided for the server computer and second version management files 11 storing the self state of correspondence on the file name and the number of update times for the client computers. In the client computer, a version/revision check processing part 21 registers the files which are stored in the first version management file 31 and are not stored in the second version management file 11, and the file whose number of update times stored in the first version management file 31 is not matched with the number of update times stored in the second version management file 11. A differential down loading processing part 22 down-loads the registered files on the part itself from the server computer.



# **LEGAL STATUS**

[Date of request for examination]

13.09.1996

[Date of sending the examiner's decision of rejection]

21.07.1999

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]

[Date of extinction of right]